DESIGN AND CONSTRUCTION GUIDELINES AND STANDARDS

DIVISION 8 • OPENINGS

08 10 00 • DOORS AND FRAMES

SECTION INCLUDES

Exterior Doors
Interior Doors

RELATED SECTIONS

03 30 00	Concrete
06 10 00	Rough Carpentry
06 20 00	Finish Carpentry
08 40 00	Entrances and Storefront
08 70 00	Hardware

INVESTIGATION AND RESEARCH

If the contract is just for door replacement without frame replacement insist on field measurement of every door before fabrication.

REFERENCE STANDARDS

Northeast Window & Door Association www.nwda.net
American National Standards Institute www.ansi.org
Window & Door Manufacturers Association www.wdma.com
National Fenestration Rating Council www.nfrc.org

AWI Architectural Woodwork Institute "Quality Certification" www.awinet.org
section 1300 (flush)
section 1400 (style and rail) and
section 1500 (factory finishing),

NEMA National Electrical Manufacturers Association www.nema.org

NFPA National Fire Protection Association www.nfpa.org

Accessible Entrances: Comply with: Massachusetts Architectural Access Board and the U.S. Architectural & Transportation Barriers Compliance Board's "Americans with Disabilities Act (ADA), Accessibility Guidelines for Buildings and Facilities (ADAAG)."

EXTERIOR ENTRIES

MATERIALS

For exterior unit entries (including barrier free units), pre-hung, set-up door units in wood frames with standard thresholds are preferred (see 03 30 00 • Concrete for depressed foundation wall illustration for installing at barrier free entries).

Fiberglass doors are preferred, although steel is acceptable if custom sizes are required or if there are security concerns. In specifying steel or fiberglass doors identify locations for reinforcing to accept hardware, including door closers.

Specify the thresholds, especially if the door will be used as an accessible entry.

Steel doors are made in various gauges of metal and with various insulating values. We require a minimum of16 gauge over a closed cell slab. Include these requirements in the specifications, as well as requirements for reinforcing to accept hardware.

Avoid applied plastic trim and mail slots.

Wood doors are not recommended for exterior use. If wood doors must be used, specify factory finish.

Egress Doors: Not more than 30 lbf required to set door in motion and not more than 15 lbf required to open door to minimum required width. Fiberglass doors in wood frames are preferred. Use metal frames (welded, galvanized, prefinished) if heavy use is anticipated.

SCREEN & STORM DOORS

MATERIALS

For exterior unit entries, provide highly durable extruded, heavy gauge aluminum framed screen doors with:

- ❑ solid bottom panels
- ❑ factory-welded or brazed frame joints
- ❑ aluminum wire or fiberglass fabric screens

Avoid Slab Doors

With insulated exterior doors, storm doors are not necessary, and may void metal door warranties. Provide screen doors (without glass insert) for ventilation

Combination storm doors/screen doors do not stand up well over time for some uses, such as DMR residences. In these buildings provide screen doors (without glass insert) with solid bottom panel.

If combination doors are used, they should be self-storing

PATIO DOORS

MATERIALS

Patio doors should be swinging, insulated steel or clad wood, with insulated tempered glass, and include the manufacturer's sliding screen door.

Avoid sliders unless there are no other choices

INTERIOR DOORS

MATERIALS

Interior unit entries: solid core, 1-3/4 inch doors with 16 ga. metal frames (welded if required for fire rating) set up for hardware at the factory. Knock-down door frames have been problematic.

Avoid interior hollow core doors.

Interior doors should be solid core doors: 1-3/8 inch; pre-hung in wood frames; (metal frames for solid core doors are typically only used with metal studs); 6-panel, pre-finished hardboard (such as Legacy or Colonist by Masonite) or field finished 6-panel wood veneer are both acceptable. Flush faced veneer doors are not acceptable.

Execution

Install frames, if doors are not pre-hung, using the door as a template to assure perfect alignment of the door and frame. Provide a fastener at each clip.

Provide UL certification label.

CLOSET DOORS

MATERIALS

Louvers and lights may be required in some interior doors, such as louvers for closet doors for elderly housing. Wood louvers are costly, but may be required to provide adequate air circulation for closets.

Louvers should not be used in family housing; undercutting the doors is preferred.

Bifold and sliding doors should be avoided.

FIRE DOORS

Due to changes in fire codes, the door industry has moved from UL 10b non-pressure testing to UL 10c positive pressure testing, which is more stringent. Therefore, specifying fire rated doors includes specifying gasketing to maintain positive pressure.

ACCESS DOORS

The location and specific requirements of access panels and doors should be considered ~ exterior requires insulation, interior requires security, etc.

Heavy duty steel access panels and doors may exceed the requirements for the certain locations. The specifications should be developed to meet the application.

DOOR SCHEDULE

Provide a door schedule in the plans.